526 Rec'd PCT/PTO 27 JUL 2000

FORM PTO-1390 (REV. 5-93)	U.S. DEPARTMENT OF COMMERCE PATENT AND TRADEMARK OFFICE	ATTORNEY'S DOCKET NUMBER NIT-210
TRANSMITTAL LETTER TO THE UNITED STATES DESIGNATED/ELECTED OFFICE (DO/EO/US)		U.S. APPLICATION NO. *(if known, see 37 CFR 1.5)* 09/601132
International Application No. PCT/JP00/02195	International Filing Date April 5, 2000	Priority Date Claimed

Title of Invention: MOBILE STATION USING POSITIONAL INFORMATION

Applicant(s) for DO/EO/US: SEE ATTACHED LIST (K. TSUNEHARA et al)

Applicant herewith submits to the United States Designated/Elected Office (DO/EO/US) the following items and other information:

1. [X] This is a FIRST submission of items concerning a filing under 35 U.S.C. 371.
2. [ ] This is a SECOND or SUBSEQUENT submission of items concerning a filing under 35 U.S.C. 371.
3. [X] This express request to begin national examination procedures (35 U.S.C. 371(f)) at any time rather than delay examination until the expiration of the applicable time limit set in 35 U.S.C. 371(b) and PCT Articles 22 and 39(1).
4. [X] A proper Demand for International Preliminary Examination was made by the 19th month from the earliest claimed priority date.
5. [X] A copy of the International Application as filed (35 U.S.C. 371(c)(2))
   a. [ ] is transmitted herewith (required only if not transmitted by the International Bureau).
   b. [X] has been transmitted by the International Bureau.
   c. [ ] is not required, as the application was filed in the United States Receiving Office (RO/US).
6. [X] A translation of the International Application into English (35 U.S.C. 371(c)(2)).
7. [ ] Amendments to the claims of the International Application under PCT Article 19 (35 U.S.C. 371(c)(3))
   a. [ ] are transmitted herewith (required only if not transmitted by the International Bureau).
   b. [ ] have been transmitted by the International Bureau.
   c. [ ] have not been made; however, the time limit for making such amendments has NOT expired.
   d. [ ] have not been made and will not be made.
8. [ ] A translation of the amendments to the claims under PCT Article 19 (35 U.S.C. 371(c)(3)).
9. [X] An oath or declaration of the inventor(s) (35 U.S.C. 371(c)(4)).
10. [ ] A translation of the annexes to the International Preliminary Examination Report under PCT Article 36 (35 U.S.C. 371(c)(5)).

Items 11. to 16. below concern other document(s) or information included:

11. [X] An Information Disclosure Statement under 37 CFR 1.97 and 1.98.
12. [ ] An assignment document for recording. A separate cover sheet in compliance with 37 CFR 3.28 and 3.31 is included.
13. [X] A FIRST preliminary amendment.
    [ ] A SECOND or SUBSEQUENT preliminary amendment.
14. [ ] A substitute specification.
15. [ ] A change of power of attorney and/or address letter.
16. [X] Other items or information:

[X] LIST OF INVENTORS' NAMES AND ADDRESSES.

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U.S. Application No. *(if known, see 37 CFR 1.5)*	International Application No.	Attorney's Docket Number
09/601132	PCT/JP00/02195	NIT-210

17. ☒ The following fees are submitted:	CALCULATIONS	PTO USE ONLY
Basic National Fee (37 CFR 1.492 (a)(1)-(5)):		
Search Report has been prepared by the EPO or JPO $840.00		
International preliminary examination fee paid to USPTO (37 CFR 1.482) $670.00		
No international preliminary examination fee (37 CFR 1.482) but international search fee paid to USPTO (37 CFR 1.445 (A)(2)) $760.00		
Neither international examination fee (37 CFR 1.482) nor international search fee (37 CFR 1.445(A)(2)) paid to USPTO ..... $ 970.00		
International preliminary examination fee paid to USPTO (37 CFR 1.482) and all claims satisfied provisions of PCT Article 33(2) to (4) ..... $ 96.00		
ENTER APPROPRIATE BASIC FEE AMOUNT =	$ 840.00	
Surcharge of $130.00 for furnishing the oath or declaration later than ☐ 20 ☐ 30 months from the earliest claimed priority date (37 CFR 1.492(e)). +	$ 0.00	

Claims	Number Filed		Number Extra	Rate		
Total	9	-20 =	0	x $18.00	$ 0.00	
Independent	6	- 3 =	3	x $78.00	$ 234.00	
Multiple dependent claim(s) (if applicable)				+ $260.00	$ 0.00	
TOTAL OF ABOVE CALCULATIONS =					$ 1,074.00	
Reduction by 1/2 for filing by small entity, if applicable. Verified Small Entity statement must also be filed. (Note 37 CFR 1.9, 1.27, 1.28).					$ 0.00	
SUBTOTAL =					$ 1,074.00	
Processing fee of $130.00 for furnishing the English translation later than ☐ 20 ☐ 30 months from the earliest claimed priority date (37 CFR 1.492(f)). +					$ 0.00	
TOTAL NATIONAL FEE =					$ 1,074.00	
Fee for recording the enclosed assignment (37 CFR 1.21(h)). The assignment must be accompanied by an appropriate cover sheet (37 CFR 3.28, 3.31). $40.00 per property. +					$ 0.00	
TOTAL FEES ENCLOSED =					$ 1,074.00	
					Amount to be: Refunded	$
					Charged	$

a. ☒ **A check in the amount of $** 1,074.00 **to cover the above fees is enclosed.**

b. ☐ **Please charge my Deposit Account No. 50-1417 in the amount of $** _____ **to cover the above fees. A duplicate copy of this sheet is enclosed.**

c. ☒ **The Commissioner is hereby authorized to charge any additional fees which may be required, or credit any overpayment to Deposit Account No. 50-1417. A duplicate copy of this sheet is enclosed.**

Note: Where an appropriate time limit under 37 CFR 1.494 or 1.495 has not been met, a petition to revive (37 CFR 1.137(a) or (b)) must be filed and granted to restore the application to pending status.

SEND ALL CORRESPONDENCE TO:
MATTINGLY, STANGER & MALUR, P.C.
104 East Hume Avenue
Alexandria, Virginia 22301
(703) 684 -1120

Signature

John R. Mattingly
Name

30,293
Registration Number

NIT-210
NT0106US

United States National Phase Patent Application

Title of the Invention

MOBILE STATION USING POSITIONAL INFORMATION

Inventors

Katsuhiko TSUNEHARA,

Mikio KUWAHARA,

Ayumu KOIDE,

Nobukazu DOI.

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

In re Patent Application of

K. TSUNEHARA et al

Serial No.

Filed: July 27, 2000

For: MOBILE STATION USING POSITIONAL INFORMATION

PRELIMINARY AMENDMENT

Assistant Commissioner of Patents
Washington, D.C. 20231

Sir:

Prior to examination, please amend the above-identified patent application as follows.

IN THE CLAIMS

Please amend claim 7 as follows.

7. (Amended) A mobile station according to [any one of] claim[s] 1 [through 6], further comprising:

a position calculation controller for controlling a frequency of position calculation by the position calculator in accordance with the result of the position comparison by the position comparator.

REMARKS

Examination is requested.

Respectfully submitted,

John R. Mattingly
Registration No. 30,293
Attorney for Applicants

MATTINGLY, STANGER & MALUR
104 East Hume Avenue
Alexandria, Virginia 22301
(703) 684-1120
Date: July 27, 2000

DESCRIPTION

MOBILE STATION USING POSITIONAL INFORMATION

Technical Field

The present invention relates to a mobile station for providing a user with a service using positional information.

Background Art

As methods of measuring a current position of a mobile station, there have been developed several methods. For example, a method of using GPS (Global Positioning System) has already been put into practice in a car navigation system or the like. Further, in a mobile communication system, there has been proposed a method of receiving radio wave transmitted from a base station by a mobile station and calculating a current position by using propagation time of the radio wave (refer to, for example, Japanese Patent Laid-Open (Kokai) No. Hei 7-181242).

As a service using the current position of the mobile station calculated by the above-described method, there is map display in navigation (refer to, for example, Japanese Patent Laid-Open (Kokai) No. Hei 1-173817). As approaching a destination, the scale of the map is changed and a route to the destination is selectively displayed.

Further, there also is Japanese Patent Laid-Open (Kokai) No. Hei 9-130859 in which although measurement of position is not carried out, in order to prevent ride past a station, entering a zone of a base station installed at the station is detected by checking a discrimination signature, whereby arrival at a destination is informed.

Disclosure of Invention

The inventors have investigated that various services can be provided by adding a mobile station with a function of knowing a current position and corresponding the current position with a target position of a destination or the like. There are enumerated services which seem to be able to be realized as problems, as follows.

As a first problem, it is pointed out that, for example, when a person of holding a mobile station rides on an electric train or a bus, a station or a bus stop to get off the electric train or the bus is previously set and when the electric train or the bus gets near to the station or the bus stop, by informing the fact to the person of holding the mobile station, the person is prevented from missing the station or the bus stop which may occur because the person falls into a doze in the electric train or the bus, or the person fails to hear announcement in the vehicle.

As a second problem, it is pointed out that, for example,

a mobile station is previously registered with a dangerous site of a pond or a road having a large traffic amount, the mobile station is carried by a wondering old man or a child and when the wondering old man or the child gets near to such a dangerous site, the fact is conveyed to a protector staying at home and the protector proceeds to protect the wondering old man or the child to thereby avoid danger.

As a third problem, it is pointed out that, for example, a mobile station is previously registered with positional information of one's own house, the mobile station is carried by a wondering old man or a child and when the wondering old man or the child is remote from one's own house by a previously set distance or more, the fact and the current position of the wondering old man or the child is conveyed to the protector staying at home and the protector proceeds to protect the wondering old man or the child.

As a fourth problem, it is pointed out that when the mobile station is a portable telephone, the portable telephone is previously registered with a site in which the portable telephone is prohibited to use as in, for example, a hospital or the like or a site in which ringer of the portable telephone is to be put off as in a movie theater or the like, when a person holding the portable telephone enters the registered site, power or ringer of the portable telephone is automatically put off and when the person is remote from the registered site, power

or ringer is automatically put on.

These problems (services) are realized by providing the person of holding the mobile station, the protector or the mobile station itself with operation in accordance with object. For that purpose, it is necessary that the mobile station is provided with application in correspondence with the operation and the application is controlled in accordance with a previously set target position and the current position of the mobile station. However, according to the conventional technology, there is simply carried out a display with regard to the current position and the target position and the above-described application control has not been realized.

It is an object of the present invention to provide a mobile station solving the above-described problems and utilizing position information having application directly operated to a user or an apparatus with a relationship between a current position and a target position as an index.

That is, in order to solve the above-described problems, according to an aspect of the present invention, there is provided a mobile station comprising a signal receiver for receiving radio wave, a position calculator for calculating a current position from a result of reception provided by the signal receiver, means for target position input for inputting a position constituting a target, a target position holder for holding the target position inputted from the means for target

position input, a position comparator for comparing the current position of the mobile station calculated by the position calculator with the target position held at the target position holder, an application operated to a user based on a result of comparison of the position comparator, and an application controller for controlling operation of the application by using the result of position comparison by the position comparator.

In order to solve the above-described problems, according to other aspect of the present invention, there is provided a mobile station, wherein the application is a vibration generator for executing generation and abeyance of vibration for vibrating the mobile station and the application controller is a vibration controller for executing a control of the generation and the abeyance of the vibration of the vibration generator.

In order to solve the above-described problems, according to still other aspect of the present invention, there is provided a mobile station, wherein the application is an alarm generator for executing generation and abeyance of alarm from the mobile station and the application controller is an alarm controller for executing a control of the generation and the abeyance of the alarm of the alarm generator.

In order to solve the above-described problems, according to still other aspect of the present invention, there is provided a mobile station, wherein the application includes means for making a telephone call for making a telephone call, a telephone

number holder for holding a telephone number of a message destination used in making the telephone call by the means for making a telephone call and a telephone message holder for holding a message transmitted after making the telephone call and the application controller is a telephone call controller for controlling to make the telephone call of the means for making a telephone call.

In order to solve the above-described problems, according to still other aspect of the present invention, there is provided a mobile station, wherein the application is a switch of ringer for switching a ringer when there is telephone signal arrival at the mobile station and the application controller is a ringer controller for controlling switching operation of the switch of ringer.

In order to solve the above-described problems, according to still other aspect of the present invention, there is provided a mobile station, wherein the application is a switch of power supply for switching power supply to the mobile station and the application controller is a power supply controller for controlling switching operation of the switch of power supply.

Brief Description of Drawings

Fig. 1 is a constitution diagram for explaining a best mode of a mobile station according to the present invention, Fig. 2 is a flowchart diagram for explaining a first example

of operation of an application controller, Fig. 3 is a flowchart diagram for explaining a second example of operation of an application controller, Fig. 4 is a constitution diagram for explaining a first example of application, Fig. 5 is a constitution diagram for explaining a second example of application, Fig. 6 is a constitution diagram for explaining a third example of application, Fig. 7 is a constitution diagram for explaining a fourth example of application, Fig. 8 is a constitution diagram for explaining a fifth example of application, Fig. 9 is a constitution diagram for explaining a sixth example of application and Fig. 10 is a constitution diagram for explaining a seventh example of application.

Best Mode for Carrying Out the Invention

A further detailed explanation will be given of a mobile station according to the present invention in reference to embodiments shown in the drawings as follows. Further, the same notations in Fig. 1 through Fig. 10 designate the same portions or similar portions.

Fig. 1 shows a constitution of an embodiment of a mobile station according to the present invention. In Fig. 1, numeral 101 designates a signal receiver for processing a received signal received by an antenna 100, numeral 102 designates a position calculator for extracting information necessary for position calculation from the signal processed by the signal

receiver 101 and calculating a current position of the mobile station, numeral 104 designates means for target position input constituting an interface for inputting a target position, numeral 105 designates a target position holder for storing data of the target position inputted from the means for target position input 104, numeral 103 designates a position comparator for comparing a result of the position calculation of the mobile station inputted from the position calculator 102 with the target position inputted from the target position holder 105, numeral 107 designates a position calculation controller for controlling execution and abeyance of the position calculation in the position calculator 102, numeral 200 designates an application of executing a predetermined service and numeral 106 designates an application controller for controlling operation of the application 200.

Although according to the above-described embodiment, a keyboard is used as the means for target position input 104, otherwise, there can be used an interface of a bar code (refer to, for example, Japanese Patent Laid-Open (Kokai) No. Hei 6-103498), voice, image or the like. Further, as a result of comparison 120 outputted by the position comparator 103, there is utilized, for example, a distance between the result of the position calculation and the target position. Further, the application controller 106 generates an application control signal 121 for controlling the application 200 by inputting the

result of comparison 120.

Here, Fig. 2 and Fig. 3 show examples of operation of the application controller 106 when the distance between the result of the position calculation and the target position is used as the result of comparison 120.

In Fig. 2, when the result of comparison 120 becomes smaller than a previously set threshold value of distance, the application controller 106 starts the application 200 by transmitting the application control signal 121 and when the result of comparison 120 becomes larger than the threshold value of distance, the application controller 106 does not start the application 200 and brings about a state on standby for determination at a succeeding time. That is, in Fig. 2, when the current position of the mobile station gets near to the target position, the application 200 is started.

In the meantime, in Fig. 3, when the result of comparison 120 becomes larger than the previously set threshold value of distance, the application controller 106 transmits the application control signal 121 and starts the application 200. That is, in Fig. 3, when the current position of the mobile station becomes remote from the target position, the application 200 is started.

The application 200 is controlled by the application control signal 121 inputted from the application controller 106 and provides a service to a user of the mobile station, a third

party of the protector of the user or the like. Fig. 4 through Fig. 10 show examples of applications for executing predetermined services.

A first example of the application 200 shown in Fig. 4 is provided with a vibration generator 201 for providing the mobile station with vibration. For example, when the mobile station gets near to the target position, the vibration generator 201 generates vibration by receiving the application control signal 121 and informs the user of the mobile station that the user gets near to the target position. The vibration generator 201 can be constituted by, for example, a small motor or the like.

A second example of the application 200 shown in Fig. 5 is provided with an alarm generator 202. For example, when the mobile station gets near to the target position, the alarm generator 202 emits an alarm from the mobile station by receiving the application control signal 121, thereby, informs the user of the mobile station that the user gets near to the target position. As the alarm generated by the alarm generator 202, for example, voice message, alarm sound or the like can be used.

A third example of the application 200 shown in Fig. 6 is provided with means for making a telephone call 210, a telephone number holder 211 and a telephone message holder 213. When the application 200 is started by receiving the application control signal 121, the means for making a telephone call 210

makes a telephone call to a telephone number 212 previously registered in the telephone number holder 211 and transmits a telephone message 214 previously registered in the telephone message holder 213. As the telephone message 214 registered in the telephone message holder 213, for example, voice message may be used and as content of the message, for example, there may be used a message that the person of holding the mobile station gets near to the target position.

A fourth example of the application 200 shown in Fig. 7 is provided with a circuit 203 (for example, switch circuit) for making off ringer of the mobile station and stops emittance of ringer which is normally rung in the case of signal arrival at the mobile station in accordance with the application control signal 121. On the other hand, a fifth example of the application 200 shown in Fig. 8 is provided with a circuit 204 (for example, switch circuit) for making on ringer of the mobile station and rings ringer normally in the case of signal arrival at the mobile station in accordance with the application control signal 121.

A sixth example of the application 200 shown in Fig. 9 is provided with a circuit 205 (for example, switch circuit) for making off power of the mobile station and brings about a state of making off power of the mobile station in accordance with the application control signal 121. On the other hand, a seventh example of the application 200 shown in Fig. 10 is

provided with a circuit 206 (for example, switch circuit) for making on power of the mobile station and brings about a state of making on power of the mobile station in accordance with the application control signal 121.

Next, an explanation will be given of the position calculation controller 107 shown in Fig. 1. The position calculation controller 107 pertinently controls execution or abeyance of the position calculation at the position calculator 102 by using the result of comparison 120 inputted from the position controller 103 to thereby realize a reduction in power consumption of the mobile station.

The position calculation controller 107 executes a control of reducing a frequency of the position calculation when, for example, the mobile station is remote from the target position and increasing the frequency of the position calculation when conversely, the mobile station is close to the target position.

Further, as other control example, the position calculation controller 107 may execute a control in which there is used a history of the result of comparison 120 inputted from the position controller 103 and when the mobile station approaches rapidly to the target position, it is determined that moving speed of the mobile station is fast and the frequency of the position calculation is increased and when conversely, the mobile station approaches gradually to the target position,

it is determined that the moving speed is slow and the frequency of the position calculation is reduced.

Further, the position calculation controller 107 may not execute the above-described control and the position calculator 120 may carry out a control of always executing the position calculation.

As described above, according to the present invention, the application is controlled in accordance with the current position and the target position of the person of holding the mobile station and service can be provided to the person of holding the mobile station or a third party.

Specifically, by setting a station or a bus stop where a person is to get off as the target position and using vibration or alarm as application, riding past of the person in an electric train or a bus can be prevented.

Further, by carrying the mobile station registered with a dangerous site or one's own house as the target position by a wondering old man or a child and using a telephone message as application, when the wondering old man or the child gets near to the dangerous site or remote from the house by a previously set distance or more, the fact is conveyed to a third party of a protector or the like and the protector proceeds to protect the wondering old man or the child to thereby avoid the danger.

Further, by setting a hospital, a movie theater or the

like as the target position and using power on/off or ringer on/off of the mobile station as application, restriction of the function of the mobile station can automatically be carried out at a site bothering others thereby.

Industrial Applicability

As described above, the mobile station according to the present invention is applied to a system of measuring the current position by utilizing wireless and is applicable also to a mobile wireless communication system such as a portable telephone or the like.

CLAIMS

1. A mobile station capable of calculating a current position by position calculation using radio wave, said mobile station comprising:

a signal receiver for receiving radio wave;

a position calculator for calculating the current position from a result of reception provided by the signal receiver;

means for target position input for inputting a position constituting a target;

a target position holder for holding the target position inputted from the means for target position input;

a position comparator for comparing the current position of the mobile station calculated by the position calculator with the target position held at the target position holder;

an application operated to a user based on a result of comparison of the position comparator; and

an application controller for controlling operation of the application by using the result of position comparison by the position comparator.

2. A mobile station capable of calculating a current position by position calculation using radio wave, said mobile station comprising:

a signal receiver for receiving radio wave;

a position calculator for calculating the current position from a result of reception provided by the signal receiver;

means for target position input for inputting a position constituting a target;

a target position holder for holding the target position inputted from the means for target position input;

a position comparator for comparing the current position of the mobile station calculated by the position calculator with the target position held at the target position holder;

a vibration generator for vibrating the mobile station based on a result of comparison of the position comparator; and

a vibration controller for controlling generation and abeyance of vibration of the vibration generator by using the result of position comparison by the position comparator.

3. A mobile station capable of calculating a current position by position calculation using radio wave, said mobile station comprising:

a signal receiver for receiving radio wave;

a position calculator for calculating the current position from a result of reception provided by the signal receiver;

means for target position input for inputting a position constituting a target;

a target position holder for holding the target position

inputted from the means for target position input;

a position comparator for comparing the current position of the mobile station calculated by the position calculator with the target position held at the target position holder;

an alarm generator for generating an alarm from the mobile station based on a result of comparison of the position comparator; and

an alarm controller for controlling generation and abeyance of the alarm of the alarm generator by using the result of position comparison by the position comparator.

4. A mobile station capable of calculating a current position by position calculation using radio wave, said mobile station comprising:

a signal receiver for receiving radio wave;

a position calculator for calculating the current position from a result of reception provided by the signal receiver;

means for target position input for inputting a position constituting a target;

a target position holder for holding the target position inputted from the means for target position input;

a position comparator for comparing the current position of the mobile station calculated by the position calculator with the target position held at the target position holder;

means for making a telephone call for making a telephone

call based on a result of comparison of the position comparator;

a telephone number holder for holding a telephone number of a message destination used in making the telephone call by the means for making a telephone call;

a telephone message holder for holding a message transmitted after making the telephone call; and

an application controller for controlling to make the telephone call by the means for making a telephone call by using the result of position comparison by the position comparator.

5. A mobile station capable of calculating a current position by position calculation using radio wave, said mobile station comprising:

a signal receiver for receiving radio wave;

a position calculator for calculating the current position from a result of reception provided by the signal receiver;

means for target position input for inputting a position constituting a target;

a target position holder for holding the target position inputted from the means for target position input;

a position comparator for comparing the current position of the mobile station calculated by the position calculator with the target position held at the target position holder;

a switch of ringer for making on or off of a ringer when there is telephone signal arrival at the mobile station based

on a result of comparison of the position comparator; and

a ringer controller for controlling switching operation of the switch of ringer by using the result of position comparison by the position comparator.

6. A mobile station capable of calculating a current position by position calculation using radio wave, said mobile station comprising:

a signal receiver for receiving radio wave;

a position calculator for calculating the current position from a result of reception provided by the signal receiver;

means for target position input for inputting a position constituting a target;

a target position holder for holding the target position inputted from the means for target position input;

a position comparator for comparing the current position of the mobile station calculated by the position calculator with the target position held at the target position holder;

a switch of power supply for switching power supply to the mobile station based on a result of comparison of the position comparator; and

a power supply controller for controlling switching operation of the switch of power supply by using the result of position comparison by the position comparator.

7. A mobile station according to any one of claims 1

through 6, further comprising:

a position calculation controller for controlling a frequency of position calculation by the position calculator in accordance with the result of the position comparison by the position comparator.

8. A mobile station according to claim 7,

wherein the position calculation controller executes a control such that the position calculation controller increases a frequency of the position calculation by the position comparator when the result of the position comparison by the position comparator signifies that the current position and the target position are close to each other and executes a control such that the position calculation controller reduces the frequency of the position calculation by the position calculator when the result of the position comparison by the position comparator signifies that the current position and the target position are remote from each other.

9. A mobile station according to claim 7,

wherein the position calculation controller uses a history of the result of the position comparison by the position comparator and executes the control of increasing the frequency of the position calculation by the position calculator when the mobile station approaches the target position at a high speed and executes the control of reducing the frequency of the position calculation by the position calculator when the mobile

station approaches the target position at a low speed.

ABSTRACT

When a person of holding a mobile station gets near to a previously set target position, application 200 is started and service of utilizing positional information is provided to the person of holding the mobile station or a third party. The mobile station includes a position comparator 103 for comparing a current position of the mobile station calculated by a position calculator 102 by using a signal from an antenna 100 with a target position inputted from means for target position input 104 and an application controller 106 for controlling the application 200 by using a result of position comparison 120. Further, a frequency of position calculation is pertinently controlled in the position calculator 102 by a position calculation controller 107 operated by the result of position comparison 120.

FIG.1

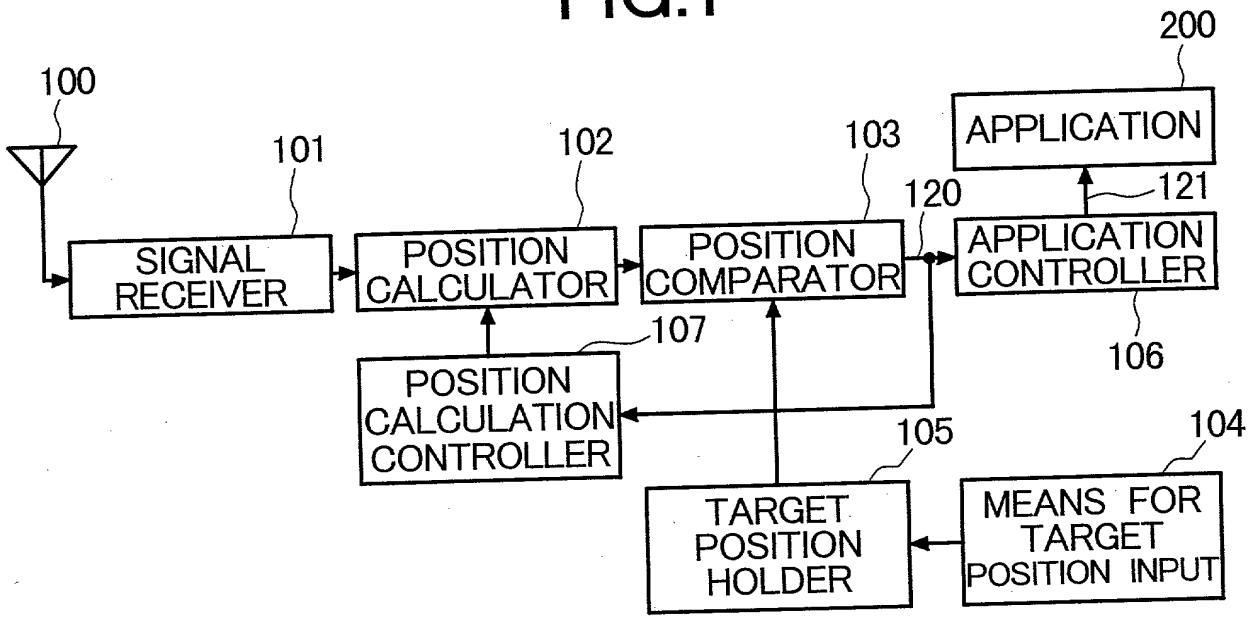

100
101
SIGNAL RECEIVER
102
POSITION CALCULATOR
103
POSITION COMPARATOR
120
200
APPLICATION
121
APPLICATION CONTROLLER
106
107
POSITION CALCULATION CONTROLLER
105
TARGET POSITION HOLDER
104
MEANS FOR TARGET POSITION INPUT

FIG.2

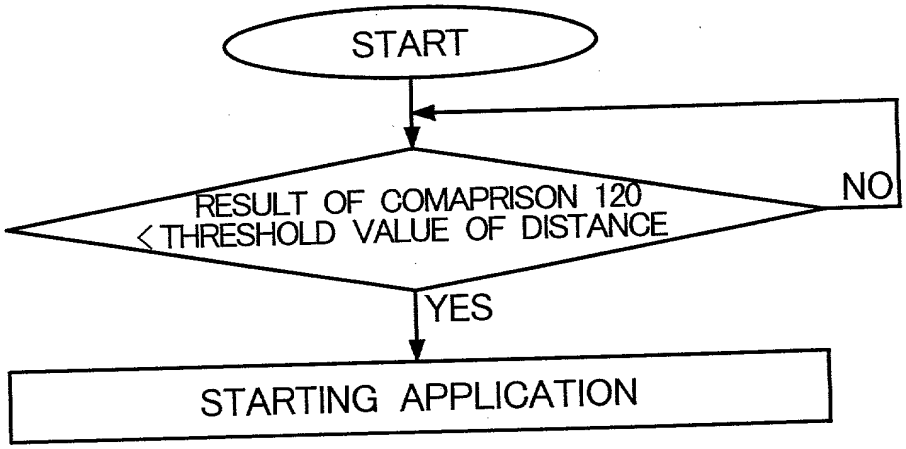

START
RESULT OF COMAPRISON 120 < THRESHOLD VALUE OF DISTANCE
NO
YES
STARTING APPLICATION

FIG.3

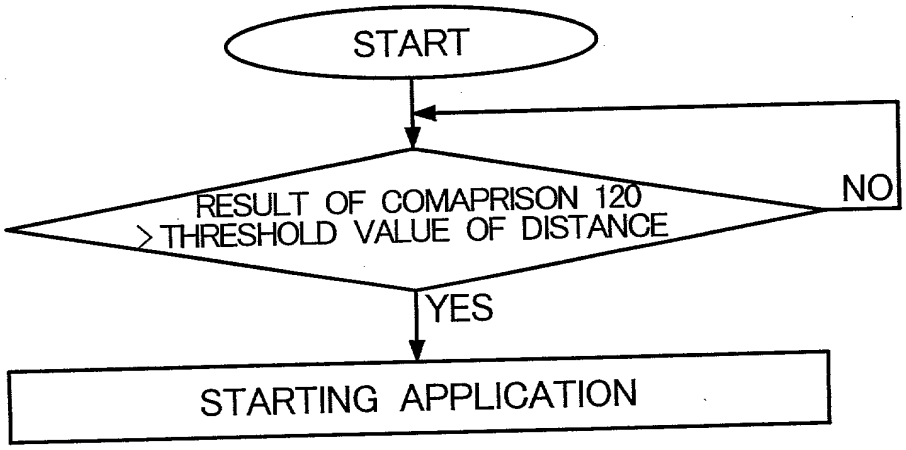


FIG.4

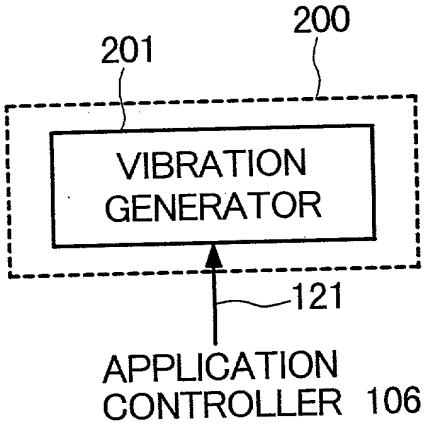


FIG.5

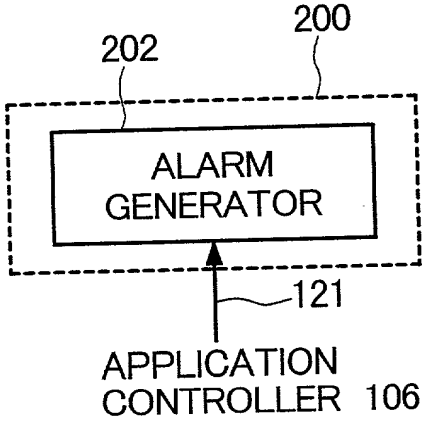


FIG.6

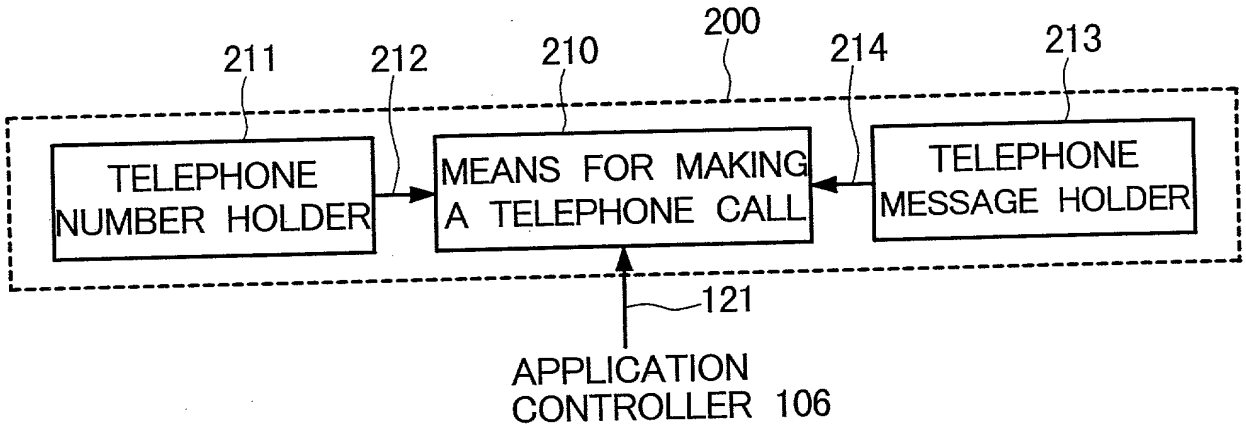

211
212
210
200
214
213
TELEPHONE NUMBER HOLDER
MEANS FOR MAKING A TELEPHONE CALL
TELEPHONE MESSAGE HOLDER
121
APPLICATION CONTROLLER 106

FIG.7

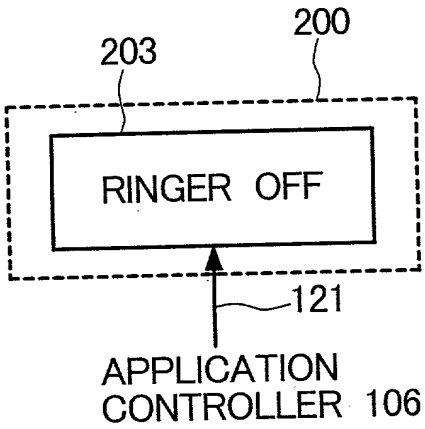

203
200
RINGER OFF
121
APPLICATION CONTROLLER 106

FIG.8

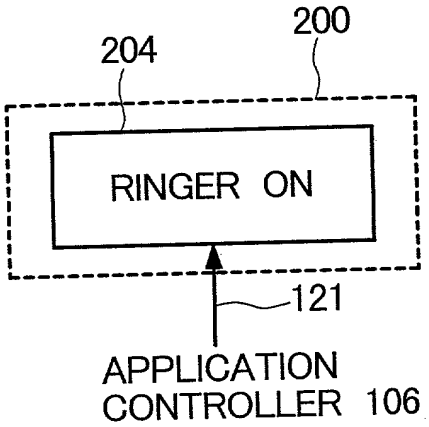


FIG.9

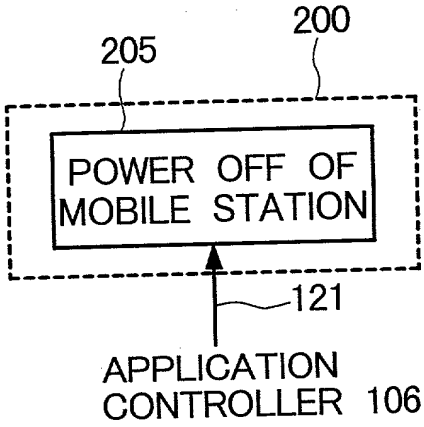
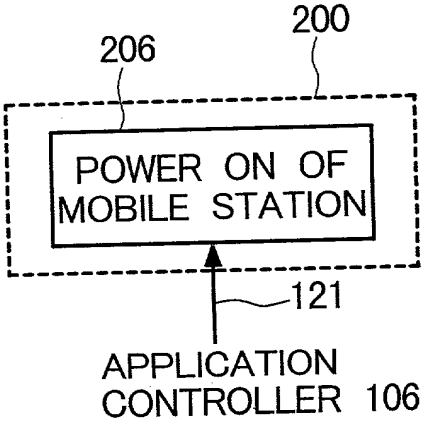


FIG.10



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Declaration and Power of Attorney For Patent Application

特許出願宣言書及び委任状

Japanese Language Declaration

日本語宣言書

下記の氏名の発明者として、私は以下の通り宣言します。

As a below named inventor, I hereby declare that:

私の住所、私書箱、国籍は下記の私の氏名の後に記載された通りです。

My residence, post office address and citizenship are as stated next to my name.

下記の名称の発明に関して請求範囲に記載され、特許出願している発明内容について、私が最初かつ唯一の発明者（下記の氏名が一つの場合）もしくは最初かつ共同発明者であると（下記の名称が複数の場合）信じています。

I believe I am the original, first and sole inventor (if only one name is listed below) or an original, first and joint inventor (if plural names are listed below) of the subject matter which is claimed and for which a patent is sought on the invention entitled

MOBILE STATION USING POSITIONAL INFORMATION

上記発明の明細書（下記の欄で×印がついていない場合は、本書に添付）は、

The specification of which is attached hereto unless the following box is checked:

☐ __月__日に提出され、米国出願番号または特許協定条約国際出願番号を__________とし、(該当する場合) __________に訂正されました。

[X] was filed on April 5, 2000 as United States Application Number or PCT International Application Number PCT/JP00/02195 and was amended on __________ (if applicable).

私は、特許請求範囲を含む上記訂正後の明細書を検討し、内容を理解していることをここに表明します。

I hereby state that I have reviewed and understand the contents of the above identified specification, including the claims, as amended by any amendment referred to above.

私は、連邦規則法典第３７編第１条５６項に定義されるとおり、特許資格の有無について重要な情報を開示する義務があることを認めます。

I acknowledge the duty to disclose information which is material to patentability as defined in Title 37, Code of Federal Regulations, Section 1.56.

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私は、米国法典第３５編１１９条 (a)-(d) 項又は３６５条(b)項に基き下記の、米国以外の国の少なくとも一カ国を指定している特許協力条約３６５ (a) 項に基ずく国際出願、又は外国での特許出願もしくは発明者証の出願についての外国優先権をここに主張するとともに、優先権を主張している、本出願の前に出願された特許または発明者証の外国出願を以下に、枠内をマークすることで、示しています。

I hereby claim foreign priority under Title 35, United States Code, Section 119 (a)-(d) or 365(b) of any foreign application(s) for patent or inventor's certificate, or 365(a) of any PCT international application which designated at least one country other than the United States, listed below and have also identified below, by checking the box, any foreign application for patent or inventor's certificate, or PCT International application having a filing date before that of the application on which priority is claimed.

Prior Foreign Application(s)
外国での先行出願

Priority Not Claimed
優先権主張なし

(Number) (番号)	(Country) (国名)	(Day/Month/Year Filed) (出願年月日)	☐
(Number) (番号)	(Country) (国名)	(Day/Month/Year Filed) (出願年月日)	☐

私は、第３５編米国法典１１９条 (e) 項に基いて下記の米国特許出願規定に記載された権利をここに主張いたします。

I hereby claim the benefit under Title 35, United States Code, Section 119(e) of any United States provisional application(s) listed below.

(Application No.) (出願番号)	(Filing Date) (出願日)	(Application No.) (出願番号)	(Filing Date) (出願日)

私は、下記の米国法典第３５編１２０条に基いて下記の米国特許出願に記載された権利、又は米国を指定している特許協力条約３６５条 (c) に基ずく権利をここに主張します。また、本出願の各請求範囲の内容が米国法典第３５編１１２条第１項又は特許協力条約で規定された方法で先行する米国特許出願に開示されていない限り、その先行米国出願書提出日以降で本出願書の日本国内または特許協力条約国際提出日までの期間中に入手された、連邦規則法典第３７編１条５６項で定義された特許資格の有無に関する重要な情報について開示義務があることを認識しています。

I hereby claim the benefit under Title 35, United States Code, Section 120 of any United States application(s), or 365(c) of any PCT international application designating the United States, listed below and, insofar as the subject matter of each of the claims of this application is not disclosed in the prior United States or PCT International application in the manner provided by the first paragraph of Title 35, United States Code Section 112, I acknowledge the duty to disclose information which is material to patentability as defined in Title 37, Code of Federal Regulations, Section 1.56 which became available between the filing date of the prior application and the national or PCT international filing date of application.

(Application No.) (出願番号)	(Filing Date) (出願日)	(Status: Patented, Pending, Abandoned) (現況：特許許可済、係属中、放棄済)
(Application No.) (出願番号)	(Filing Date) (出願日)	(Status: Patented, Pending, Abandoned) (現況：特許許可済、係属中、放棄済)

私は、私自身の知識に基ずいて本宣言書中で私が行なう表明が真実であり、かつ私の入手した情報と私の信じるところに基ずく表明が全て真実であると信じていること、さらに故意になされた虚偽の表明及びそれと同等の行為は米国法典第１８編第１００１条に基ずき、罰金または拘禁、もしくはその両方により処罰されること、そしてそのような故意による虚偽の声明を行なえば、出願した、又は既に許可された特許の有効性が失われることを認識し、よってここに上記のごとく宣誓を致します。

I hereby declare that all statements made herein of my own knowledge are true and that all statements made on information and belief are believed to be true; and further that these statements were made with the knowledge that willful false statements and the like so made are punishable by fine or imprisonment, or both, under Section 1001 of Title 18 of the United States Code and that such willful false statements may jeopardize the validity of the application or any patent issued thereon.

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委任状： 私は下記の発明者として、本出願に関する一切の手続きを米特許商標局に対して遂行する弁理士または代理人として、下記の者を指名いたします。（弁護士、または代理人の氏名及び登録番号を明記のこと）

POWER OF ATTORNEY: As a named inventor, I hereby appoint the following attorney(s) and/or agent(s) to prosecute this application and transact all business in the Patent and Trademark Office connected therewith (*list name and registration number*)

Thomas E. Beall, Jr., Reg. No.22,410;
John R. Mattingly, Reg. No.30,293;
Daniel J. Stanger, Reg. No.32,846;
Shrinath Malur, Reg. No.34,663;
Gene W. Stockman, Reg. No.21,021;
Jeffrey M. Ketchum, Reg. No.31,174;
Scott W. Brickner, Reg.No.34553;

書類送付先

Send Correspondence to:
BEALL LAW OFFICES
104 East Hume Avenue
Alexandria, Virginia 22301

直接電話連絡先： (名前及び電話番号)

Direct Telephone Calls to: (*name and telephone number*)
Telephone: (703) 684-1120
Fax: (703) 684-1157

唯一または第一発明者名	**Full name of sole or first inventor** Katsuhiko TSUNEHARA
発明者の署名 日付	**Inventor's signature** **Date** Katsuhiko Tsunehara 5/31/2000
住所	**Residence** Kokubunji, Japan JPX
国籍	**Citizenship** Japan
私書箱	**Post Office Address** c/o Hitachi, Ltd., Intellectual Property Group New Marunouchi Bldg. 5-1, Marunouchi 1-chome, Chiyoda-ku, Tokyo 100-8220, Japan

(第二以降の共同発明者についても同様に記載し、署名をすること)

(Supply similar information and signature for second and subsequent joint inventors.)

第二共同発明者名 2-00	**Full name of second joint inventor, if any** Mikio KUWAHARA
第二共同発明者の署名 日付	**Second inventor's signature** **Date** Mikio Kuwahara 6/1/2000
住所	**Residence** Kokubunji, Japan JPX
国籍	**Citizenship** Japan
私書箱	**Post Office Address** c/o Hitachi, Ltd., Intellectual Property Group New Marunouchi Bldg. 5-1, Marunouchi 1-chome, Chiyoda-ku, Tokyo 100-8220, Japan
第三共同発明者名 3-00	**Full name of third joint inventor, if any** Ayumu KOIDE
第三共同発明者の署名 日付	**Third inventor's signature** **Date** Ayumu Koide 6/7/2000
住所	**Residence** Yokohama, Japan JPX
国籍	**Citizenship** Japan
私書箱	**Post Office Address** c/o Hitachi, Ltd., Intellectual Property Group New Marunouchi Bldg. 5-1, Marunouchi 1-chome, Chiyoda-ku, Tokyo 100-8220, Japan
第四共同発明者名 4-00	**Full name of fourth joint inventor, if any** Nobukazu DOI
第四共同発明者の署名 日付	**Fourth inventor's signature** **Date** Nobukazu Doi 6/2/2000
住所	**Residence** Hachioji, Japan JPX
国籍	**Citizenship** Japan
私書箱	**Post Office Address** c/o Hitachi, Ltd., Intellectual Property Group New Marunouchi Bldg. 5-1, Marunouchi 1-chome, Chiyoda-ku, Tokyo 100-8220, Japan
第五共同発明者名	**Full name of fifth joint inventor, if any**
第五共同発明者の署名 日付	**Fifth inventor's signature** **Date**
住所	**Residence**
国籍	**Citizenship**
私書箱	**Post Office Address**